

AMENDMENT TO THE SPECIFICATION

Please amend the specification at page 3, lines 1-19, as follows:

The joint enhancing composition of the invention preferably contains at least two, three, five, seven, nine, eleven, thirteen, preferably fifteen, or more preferably all of the following elements: octacosanol (defatted wheat germ oil), ~~elecampane root~~ (*Inula sp.*) ~~elecampane root~~ (*Linula*), quercetin, L-cysteine, vitamin B1 (thiamin HCl), white oak bark (*Quercus alba*) (*Quereus Alba*), vitamin B5 (pantothenic acid, calcium D-pantothenate), *Aloe vera* ~~aloe vera~~ gel, black cohosh (*Cimicifuga racemosa*) (*Cimicifuga Racewosh*), androstenedione, oat straw (*Avena sativa*) (*Avena Sativa*), oat straw (*Avena sativa*) (*Avena Sativa*) powder, L-methionine, shiitake mushroom (*Lentius elodes*) ~~L-Methionine, Shitake mushroom~~ (*Lentius Elodes*), bromelain, horsetail (*Equisetum spp.*) (*Equisetum*), and borage oil (*Borago officianalis*) (*Borago Offieianalis*). For example, the composition may contain oat straw (*Avena sativa*) (*Avena Sativa*) (preferably between 15 and 25 mg, more preferably 21.5 mg), oat straw (*Avena sativa*) (*Avena Sativa*) powder (preferably between 150 and 170 mg, more preferably 160.0 mg), bromelain (2400 GDU) (preferably between 90 and 110 mg, more preferably 100.0 mg), pantothenic acid (Vitamin B5) (preferably between 30 and 40 mg, more preferably 35.0 mg), L-methionine (preferably between 25 to 40 mg, more preferably 33.0 mg), quercetin (preferably between 60 and 75 mg, more preferably 66.0 mg), horsetail silicic acid (preferably between 25.0 and 40.0 mg, more preferably 33.0 mg), and borage oil powder (preferably between 25 and 40 mg, more preferably 33.0 mg). Desirably, the oat straw SE is in an initial ratio of 10:1 and the initial concentration of the horsetail SE silicic acid is 1.5-3.0%. The borage oil powder is preferably admixed with gamma lipoic acid (GLA), more preferably at an initial concentration of 6.6%.

Please amend the specification at page 8, lines 7-31, as follows:

According to this invention, the administration of a joint enhancing composition increases the expression of endogenous expression of lubricin in the synovial joints such that the lubrication of the joints is increased. Desirably, the expression of endogenous lubricin is increased by at least 10%, 20%, 30%, 40%, 50%, 60%, 70%, 80%, 90%, 100%, 200%, 300%, 500%, or more than 500% compared to an untreated control. The composition preferably contains two, three, five, seven, nine, eleven, thirteen, more preferably fifteen, or more preferably all of the substances of table 1. For example, this composition may contain the following components: oat straw (*Avena sativa*) (~~*Avena Sativa*~~) (between 15.0 and 25.0 mg, preferably 21.5 mg), oat straw (*Avena sativa*) (~~*Avena Sativa*~~) powder (between 150.0 and 170.0 mg, preferably 160.0 mg), Bromelain (2400 GDU) (between 90.0 and 110.0 mg, preferably 100.0 mg), Pantothenic acid (Vitamin B5) (between 30.0 and 40.0 mg, preferably 35.0 mg), L-methionine (between 25.0 and 40.0 mg, preferably 33.0 mg), Quercetin (between 60.0 and 75.0 mg, preferably 66.0 mg), horsetail SE silicic acid (between 25.0 and 40.0 mg, preferably 33.0 mg), and borage oil powder (between 25.0 and 40.0 mg, preferably 33.0 mg). Desirably, the oat straw SE is in an initial ratio of 10:1 and the initial concentration of the horsetail SE silicic acid is 1.5-3.0%. The borage oil powder is preferably admixed with GLA, more preferably at an initial concentration of 6.6%. The components are present in the compositions of the invention in varying amounts depending on the nature and condition of the joint degenerative condition being treated, the anticipated frequency and duration of therapy, and the type of pharmaceutical composition used to deliver joint enhancing composition. Typically, therapy is designed to deliver between 0.1 and 4000 mg of the composition per day to the patient. Preferably, the patient receives 0.5 mg, 1 mg, 10 mg, 50 mg, 100 mg, 250 mg, 500 mg, 750 mg, 1000 mg, 1500 mg, 2000 mg, 2500mg, 3000 mg, 3500 mg, or 4000 mg of the composition between one to ten times per day.

Please amend Table 1 on page 14 of the specification as follows:

Table 1
Summary of evaluation of hits in antibody based assay

BRD No.	Supplement Name	Alternate Name	Supplier
G5	Octacosanol	Defatted Wheat Germ Oil	Solgar
G7	Elecampane Root	Linula	Nature's Way
G15	Quercetin	Quercetin	Twin Lab
G22	L-Cysteine	L-Cysteine	Twin Lab
G27	Vitamin B1	Thiamin HCl	GNC
G30	White Oak Bark	<u>Quercus alba</u> Quereus Alba	Solaray
G-35	Pantothenic Acid	Calcium d-Pantothenate	GNC
G-46	<u>Aloe vera</u> Aloe Vera Gel	<u>Aloe vera</u> Aloe Vera Gel	GNC
G-53	Black Cohosh	<u>Cimicifuga racemosa</u> Cimicifuga Racewosh	GNC
G-57	Androstenedione	Androstenedione	GNC
G-60	<u>Avena sativa</u> Avena Sativa	Oat Straw	GNC
G-66	L-Methionine	L-Methionine	Solgar
G-98	Shitake Mushroom	<u>Lentius elodes</u> Lentius Elodes	GNC
G-119	Horse Tail	<u>Equisetum spp.</u> Equisetum	GNC
G-126	Bromelain	Bromelain	GNC
G-134	Borage Oil	<u>Borago officianalis</u> Borago Officianalis	GNC

Please amend the specification at page 15, lines 27-30, as follows:

Plates were incubated for one hour at room temperature after which the contents of each well was emptied. Wells were washed twice with PBS and 0.5 µg/mL of peanut agglutinin (Arachis hypogea) (~~Arachis hypogea~~) conjugated to FITC was added to each well. The binding site of peanut agglutinin in the lubricin protein is shown in FIGURE 1.

Please amend the specification at page 17, lines 3-18, as follows:

A patient suffering from rheumatoid arthritis in the hips is treated twice a day, every day, with 200.0 mg of a joint enhancing composition (containing 25.0 mg oat straw (*Avena sativa*) (~~*Avena Sativa*~~) SE 10:1, 155.0 mg oat straw (*Avena sativa*) (~~*Avena Sativa*~~) powder, 100.0 mg Bromelain (2400 GDU), 35.0 mg Pantothenic acid (Vitamin B5), 33.0 mg L-methionine, 60.0 mg Quercetin, 26.0 mg horsetail SE 1.5-3.0% silicic acid, and 25.0 mg borage oil powder (6.6% GLA - Bioriginal)). If desired, the patient may also take ibuprofen to reduce pain to the joints.

Example 2: Treatment of osteoarthritis

A geriatric patient diagnosed with osteoarthritis is administered twice a day, everyday, with 100.0 mg of a joint enhancing composition (containing 30.0 mg oat straw (*Avena sativa*) (~~*Avena Sativa*~~) SE 10:1, 155.0 mg oat straw (*Avena sativa*) (~~*Avena Sativa*~~) powder, 110.0 mg Bromelain (2400 GDU), 35.0 mg Pantothenic acid (Vitamin B5), 33.0 mg L-methionine, 60.0 mg Quercetin, 26.0 mg horsetail SE 1.5-3.0% silicic acid, and 25.0 mg borage oil powder (6.6% GLA - Bioriginal)). Because the patient suffers from pain mainly in the right knee, cortisone is also injected into this knee to alleviate the pain.